



[4910-13-P]

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2017-1116; Product Identifier 2016-NE-32-AD]

RIN 2120-AA64

Airworthiness Directives; Honeywell International Inc. Turbofan Engines

AGENCY: Federal Aviation Administration (FAA), DOT.

ACTION: Notice of proposed rulemaking (NPRM).

SUMMARY: We propose to supersede Airworthiness Directive (AD) 2017-20-06, which applies to certain Honeywell International Inc. (Honeywell) AS907-1-1A turbofan engines. AD 2017-20-06 requires a one-time inspection of the second stage low-pressure turbine (LPT2) blades and, if the blades fail the inspection, the replacement of the blades with a part eligible for installation. Since we issued AD 2017-20-06, we determined the need to clarify the Applicability and Compliance sections of AD 2017-20-06. This proposed AD would continue to require a one-time inspection of the LPT2 blades and, if the blades fail the inspection, the replacement of the blades with a part eligible for installation. We are proposing this AD to address the unsafe condition on these products.

DATES: We must receive comments on this proposed AD by [INSERT DATE 45 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

ADDRESSES: You may send comments, using the procedures found in 14 CFR 11.43 and 11.45, by any of the following methods:

- Federal eRulemaking Portal: Go to <http://www.regulations.gov>. Follow the instructions for submitting comments.
- Fax: 202-493-2251.

- Mail: U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE., Washington, DC 20590.

- Hand Delivery: Deliver to Mail address above between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays.

For service information identified in this NPRM, contact Honeywell International Inc., 111 S 34th Street, Phoenix, AZ 85034-2802; phone: 800-601-3099; Internet: <https://myaerospace.honeywell.com/wps/portal>. You may view this service information at the FAA, Engine and Propeller Standards Branch, 1200 District Avenue, Burlington, MA. For information on the availability of this material at the FAA, call 781-238-7759.

Examining the AD Docket

You may examine the AD docket on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2017-1116; or in person at the Docket Management Facility between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this NPRM, the regulatory evaluation, any comments received, and other information. The street address for the Docket Office (phone: 800-647-5527) is in the ADDRESSES section. Comments will be available in the AD docket shortly after receipt.

FOR FURTHER INFORMATION CONTACT: Joseph Costa, Aerospace Engineer, Los Angeles ACO Branch, FAA, 3960 Paramount Blvd., Lakewood, CA 90712-4137; phone: 562-627-5246; fax: 562-627-5210; email: joseph.costa@faa.gov.

SUPPLEMENTARY INFORMATION:

Comments Invited

We invite you to send any written relevant data, views, or arguments about this proposed AD. Send your comments to an address listed under the ADDRESSES section. Include "Docket No. FAA-2017-1116; Product Identifier 2016-NE-32-AD" at the

beginning of your comments. We specifically invite comments on the overall regulatory, economic, environmental, and energy aspects of this NPRM. We will consider all comments received by the closing date and may amend this NPRM because of those comments.

We will post all comments we receive, without change, to <http://www.regulations.gov>, including any personal information you provide. We will also post a report summarizing each substantive verbal contact we receive about this proposed AD.

Discussion

We issued AD 2017-20-06, Amendment 39-19063 (82 FR 46379, October 5, 2017), (“AD 2017-20-06”), for certain Honeywell International Inc. (Honeywell) AS907-1-1A turbofan engines. AD 2017-20-06 requires a one-time inspection of the LPT2 blades and, if the blades fail the inspection, the replacement of the blades with a part eligible for installation. AD 2017-20-06 resulted from reports of loss of power due to failure of the LPT2 blade. We issued AD 2017-20-06 to prevent failure of the LPT2 blades caused by excessive blade tip shroud wear, failure of one or more new production engines with the same time-in-service, and loss of the airplane.

Actions Since AD 2017-20-06 Was Issued

Since we issued AD 2017-20-06, we determined the need to clarify the Applicability and Compliance sections of that AD. We received comments from operators and maintenance facilities indicating that these sections of the AD could have been misinterpreted to mean that the borescope inspections required by this AD applied to all Honeywell AS907-1-1A turbofan engines with LPT2 rotor blades, part number (P/N) 3035602-1, installed. We revised these sections to clarify that only Honeywell AS907-1-1A turbofan engines with LPT2 rotor blades, P/N 3035602-1, installed, with more than 8,000 hours since new on the effective date of this AD are affected.

Related Service Information under 1 CFR part 51

We reviewed Honeywell Service Bulletin (SB) AS907-72-9067, Revision 1, dated March 20, 2017. This SB describes procedures for inspecting the LPT2 blades. This service information is reasonably available because the interested parties have access to it through their normal course of business or by the means identified in the ADDRESSES section.

Other Related Service Information

We reviewed Honeywell SB AS907-72-9067, Revision 0, dated December 12, 2016, which also describes procedures for inspecting the LPT2 blades. We also reviewed the Honeywell Light Maintenance Manual, AS907-1-1A, 72-00-00, Section 72-05-12, dated May 25, 2016, and Section 72-55-03, dated September 27, 2011, which provide additional guidance for performing borescope inspections.

FAA's Determination

We are proposing this AD because we evaluated all the relevant information and determined the unsafe condition described previously is likely to exist or develop in other products of the same type design.

Proposed AD Requirements

This proposed AD would retain the requirements of AD 2017-20-06 to perform a one-time inspection of affected LPT2 blades and, if the blades fail the inspection, replace the blades with a part eligible for installation. This proposed AD would clarify that these requirements apply only to Honeywell AS907-1-1A turbofan engines with LPT2 rotor blades, P/N 3035602-1, installed, with more than 8,000 hours since new on the effective date of this AD.

Costs of Compliance

We estimate that this proposed AD affects 40 engines installed on airplanes of U.S. registry.

We estimate the following costs to comply with this proposed AD:

Estimated costs

Action	Labor cost	Parts cost	Cost per product	Cost on U.S. operators
Borescope inspection	10 work-hours x \$85 per hour = \$850	\$0	\$850	\$34,000
Report results of inspection	1 work-hour x \$85 per hour = \$85	\$0	\$85	\$3,400

We estimate the following costs to do any necessary replacements that would be required based on the results of the inspection. We estimate that 40 engines will need this replacement.

On-condition costs

Action	Labor cost	Parts cost	Cost per product
Replacement of the LPT2 blade set	50 work-hours X \$85 per hour = \$4,250	\$50,000	\$54,250

Paperwork Reduction Act

A federal agency may not conduct or sponsor, and a person is not required to respond to, nor shall a person be subject to penalty for failure to comply with a collection of information subject to the requirements of the Paperwork Reduction Act unless that collection of information displays a current valid OMB control number. The control number for the collection of information required by this proposed AD is 2120-0056. The paperwork cost associated with this proposed AD has been detailed in the Costs of Compliance section of this document and includes time for reviewing instructions, as well as completing and reviewing the collection of information. Therefore, all reporting associated with this proposed AD is mandatory. Comments concerning the accuracy of

this burden and suggestions for reducing the burden should be directed to the FAA at 800 Independence Ave., SW, Washington, DC 20591. ATTN: Information Collection Clearance Officer, AES-200.

Authority for this Rulemaking

Title 49 of the United States Code specifies the FAA's authority to issue rules on aviation safety. Subtitle I, Section 106, describes the authority of the FAA Administrator. Subtitle VII, Aviation Programs, describes in more detail the scope of the Agency's authority.

We are issuing this rulemaking under the authority described in Subtitle VII, Part A, Subpart III, Section 44701, "General requirements." Under that section, Congress charges the FAA with promoting safe flight of civil aircraft in air commerce by prescribing regulations for practices, methods, and procedures the Administrator finds necessary for safety in air commerce. This regulation is within the scope of that authority because it addresses an unsafe condition that is likely to exist or develop on products identified in this rulemaking action.

This AD is issued in accordance with authority delegated by the Executive Director, Aircraft Certification Service, as authorized by FAA Order 8000.51C. In accordance with that order, issuance of ADs is normally a function of the Compliance and Airworthiness Division, but during this transition period, the Executive Director has delegated the authority to issue ADs applicable to engines, propellers, and associated appliances to the Manager, Engine and Propeller Standards Branch, Policy and Innovation Division.

Regulatory Findings

We have determined that this proposed AD would not have federalism implications under Executive Order 13132. This proposed AD would not have a substantial direct effect on the States, on the relationship between the national

Government and the States, or on the distribution of power and responsibilities among the various levels of government.

For the reasons discussed above, I certify that the proposed regulation:

- (1) Is not a “significant regulatory action” under Executive Order 12866,
- (2) Is not a “significant rule” under the DOT Regulatory Policies and Procedures (44 FR 11034, February 26, 1979),
- (3) Will not affect intrastate aviation in Alaska, and
- (4) Will not have a significant economic impact, positive or negative, on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

List of Subjects in 14 CFR Part 39

Air transportation, Aircraft, Aviation safety, Incorporation by reference, Safety.

The Proposed Amendment

Accordingly, under the authority delegated to me by the Administrator, the FAA proposes to amend 14 CFR part 39 as follows:

PART 39 - AIRWORTHINESS DIRECTIVES

- 1. The authority citation for part 39 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 44701.

§ 39.13 [Amended]

- 2. The FAA amends § 39.13 by removing Airworthiness Directive (AD) 2017-20-06, Amendment 39-19063 (82 FR 46379, October 5, 2017), and adding the following new AD:

Honeywell International Inc.: Docket No. FAA-2017-1116; Product Identifier 2016-NE-32-AD.

(a) Comments Due Date

The FAA must receive comments on this AD action by [INSERT DATE 45 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

(b) Affected ADs

This AD replaces AD 2017-20-06, Amendment 39-19063 (82 FR 46379, October 5, 2017).

(c) Applicability

This AD applies to Honeywell International Inc. (Honeywell) AS907-1-1A turbofan engines with second stage low-pressure turbine (LPT2) rotor blades, part number 3035602-1, installed, that have more than 8,000 hours since new on the effective date of this AD.

(d) Subject

Joint Aircraft System Component (JASC) Code 7250, Turbine Section.

(e) Unsafe Condition

This AD was prompted by reports of loss of power due to failure of the LPT2 blade. We are issuing this AD to prevent failure of the LPT2 blades. The unsafe condition, if not corrected, could result in failure of one or more engines and loss of the airplane.

(f) Compliance

Comply with this AD within the compliance times specified, unless already done.

(g) Required Actions

Within 200 hours time in service after the effective date of this AD, do the following:

(1) Perform a one-time borescope inspection for wear of the Z gap contact area at the blade tip shroud for each of the 62 LPT2 rotor blades. Use the Accomplishment Instructions, Paragraph 3.B.(1), of Honeywell Service Bulletin (SB) AS907-72-9067, Revision 1, dated March 20, 2017, to do the inspection.

(2) If the measured wear and/or fretting of any Z gap contact area is greater than 0.005 inch, replace the LPT2 rotor assembly with a part eligible for installation before further flight.

(3) Using a borescope, make a clear digital image of the Z gap contact area at the blade tip shroud of the 62 LPT2 rotor blades, and do the following:

(i) Identify the three Z gap contact areas with the greatest amount of wear and/or fretting.

(ii) Record the blade position on the LPT2 rotor assembly and the measured wear of the three Z gap contact areas with the greatest amount of wear and/or fretting.

(iii) Send the results to Honeywell at engine.reliability@honeywell.com within 30 days after completing these actions.

(h) Credit for Previous Actions

You may take credit for the actions required by paragraphs (g)(1) and (2) of this AD, if you performed these actions before the effective date of this AD using Honeywell SB AS907-72-9067, Revision 0, dated December 12, 2016.

(i) Paperwork Reduction Act Burden Statement

A federal agency may not conduct or sponsor, and a person is not required to respond to, nor shall a person be subject to a penalty for failure to comply with a collection of information subject to the requirements of the Paperwork Reduction Act unless that collection of information displays a current valid OMB Control Number. The OMB Control Number for this information collection is 2120-0056. Public reporting for this collection of information is estimated to be approximately 5 minutes per response, including the time for reviewing instructions, completing and reviewing the collection of information. All responses to this collection of information are mandatory. Comments concerning the accuracy of this burden and suggestions for reducing the burden should be

directed to the FAA at: 800 Independence Ave. SW, Washington, DC 20591, Attn: Information Collection Clearance Officer, AES-200.

(j) Alternative Methods of Compliance (AMOCs)

(1) The Manager, Los Angeles ACO Branch, FAA, may approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. In accordance with 14 CFR 39.19, send your request to your principal inspector or local Flight Standards District Office, as appropriate. If sending information directly to the manager of the Los Angeles ACO Branch, send it to the attention of the person identified in paragraph (k)(1) of this AD.

(2) Before using any approved AMOC, notify your appropriate principal inspector, or lacking a principal inspector, the manager of the local flight standards district office/certificate holding district office.

(k) Related Information

(1) For more information about this AD, contact Joseph Costa, Aerospace Engineer, Los Angeles ACO Branch, FAA, 3960 Paramount Blvd., Lakewood, CA 90712-4137; phone: 562-627-5246; fax: 562-627-5210; email: joseph.costa@faa.gov.

(2) For service information identified in this AD, contact Honeywell International Inc., 111 S 34th Street, Phoenix, AZ 85034-2802; phone: 800-601-3099; Internet: <https://myaerospace.honeywell.com/wps/portal>.

Issued in Burlington, Massachusetts, on January 24, 2018.

Robert J. Ganley,
Manager, Engine and Propeller Standards Branch,
Aircraft Certification Service.

[FR Doc. 2018-01704 Filed: 1/29/2018 8:45 am; Publication Date: 1/30/2018]